# power amps



**CPS - SERIES** 

POWER

**AMPLIFIERS** 



The New **EV CPS Series**Power Amplifiers
with 5-way
Protection offer
Outstanding
Performance and
Reliability for
Permanent
Installations.

The CPS Series is a high performance line of amplifiers with innovative protection/safety features with an unmatched dynamic range capability that exceeds the unique usage demands for fixed-installation applications. With its 5-way protection/safety system, the CPS series ensures the most reliable operation favored by sound contractors in all sound reinforcement applications.

## 5-way Protection/Safety System

With the unique needs of the fixed-installation customer in mind, EV has developed and manufactured the CPS Series of power amplifiers that will satisfy even the most demanding applications. The CPS Series 5-way protection system was designed to protect both the amplifier and the speaker from damage resulting from line shorts, thermal overload, power surges, signal degradation and signal overload. This unique capability gives the CPS series the ability to function reliably in the challenging conditions encountered in fixed-installation sound systems.

## Superior Dynamic Range

Given the multitude of building configurations and sound reinforcement challenges, EV has taken the uncertainty out of performance and reliability with the new CPS Series of power amplifiers. The CPS Series achieves it's outstanding dynamic range through the use of our unique Nonlinear Signal monitor. This feature limits amplifier distortion to less than 1 percent, eliminating "hard-edged" clipping which can destroy most speaker systems.

The amplifiers' power supply is specifically designed to deliver high peak signals. Since live music and voice signals usually contain very high peak transients compared to the average signal level, the CPS Series amplifiers have a burst signal output capability "headroom" in excess of 130% over their average continuous rating.

#### Distinctive Features and Benefits of the CPS Series

#### 5-way Protection/Safety System

- Over-Temperature Protection Ensures that the amplifier will never reach a critical or damaging operating temperature.
- DC Protection Eliminates amplifier damage in case of direct shorts.
- Excessive Back-EMF Monitor Eliminates amplifier damage for reverse current flow back into amplifier due to speaker failure.
- Low AC Line Voltage Monitor Prevents amplifier performance problems and potential speaker damage in case of AC line "Brown Outs".
- 3-step Front-to-Rear Cooling Fan System Quiet operation with greater cooling efficiency.

#### Superior Dynamic Range

- Nonlinear Signal Monitor (dynamic limiter) Limits amplifier distortion to under 1 percent to eliminate "hard edged" clipping and provide higher average volume level.
- High Peak Delivery Power Supply Allows for a burst signal output capacity in excess of 130% over CPS Series average continuous rating.

#### Reliability

• Highest Standards of Quality and Design — 3-year warranty and extensive customer support.

		CPS 1	CPS 2	CPS 3	CPS 4
Maximum Power (<1% THD,1kHz, both channels driven)	Load Impedance	2 ohms = 650 watts 4 ohms = 450 watts 8 ohms = 280 watts	850 watts 600 watts 380 watts	1200 watts 900 watts 560 watts	1800 watts 1300 watts 850 watts
Rated Power (<0.2% THD, 20 to 20,000 Hz, both channels driven)		2 ohms = 450 watts 4 ohms = 350 watts 8 ohms = 230 watts	650 watts 500 watts 300 watts	1000 watts 800 watts 500 watts	1500 watts 1200 watts 750 watts
Maximum Bridged Output (<1% THD, 1 kHz)		4 ohms = 1300 watts 8 ohms = 900 watts	1700 watts 1200 watts	2400 watts 1800 watts	3600 watts 2600 watts
Slew Rate		25 V/μs	30 V/μs	35 Wμs	40 V/μs
Total Harmonic Distortion		<0.05%	<0.05%	<0.05%	<0.05%
Intermodulation Distortion		<0.08 %	<0.08 %	<0.01 %	<0.01 %
Crosstalk (at 1 kHz)		>80 dB	>80 dB	>70 dB	>80 dB
Input Impedance (Balanced)	20 k ohms		20 k ohms	20 k ohms	20 k ohms
Signal to Noise Ratio (dB-A Weighted)	>105 dB		>105 dB	>105 dB	>105 dB
Dimensions (Inches)	Height 5.2 (133mm) Width 19.0 (483mm) Depth 15.2 (386mm)		5.2 (133mm) 19.0 (483mm) 15.2 (386mm)	5.2 (133mm) 19.0 (483mm) 15.4 (390mm)	5.2 (133mm) 19.0 (483mm) 15.4 (390mm)
Weight (Pounds)	33.1 (15 kg)		35.3 (16 kg)	59.5 (27 kg)	63.9 (29 kg)

Power requirements: 120v, 50 Hz - 60 Hz, factory configured.
Protection: Audio limiters, high temperature, DC, HF, Back-EMF, Peak current limiters, Inrush current limiters, turn-on delay.
Cooling: Front-to-rear, 3-stage-fans or 4-stage-fans (CPS3, CPS4)
Note: Amplifier at rated conditions, both channels driven with 8 ohms load, unless otherwise specified.



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Singapore

### EVERYWHERE\*\*

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WHATEVER THE APPLICATION -CLUBS, HOUSES OF WORSHIP, STADIUMS AND EVERYWHERE IN BETWEEN - EV SPEAKERS. MICROPHONES AND **ELECTRONICS SET** THE STANDARD FOR INNOVATION. PERFORMANCE, VFRSATILITY AND VALUE. BELIEVE IT TODAY BY PUTTING EV TO WORK FOR YOU.

For customer orders, contact the Customer Service department at 800/685-6386

For warranty repair or service information, contact the Service Repair department at 800/685-2606

For technical assistance, contact Technical Support at 800/234-6831

Please refer to the Engineering Data Sheet for warranty information. Specifications subject to change without notice.